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- **40**. The method of claim **38** which results in the production of an antibody fragment.
- 41. The method of claim 38 wherein the antibody fragment is an $F(ab)_2$ fragment.
- **42**. The method of claim **40** wherein the antibody fragment 5 is a Fab fragment.
- 43. The method of claim 38 which results in the production of an antibody.
- 44. A method for making an antibody capable of specifically binding a desired antigen, the antibody comprising heavy and light immunoglobulin polypeptide chains each comprising a variable region sequence and a human constant region sequence, the method comprising the steps of (a) transforming a recombinant host cell with a replicable expression vector comprising DNA encoding the heavy immunoglobulin polypeptide chain and a replicable expression vector comprising DNA encoding the light immunoglobulin polypeptide chain, wherein each of the DNAs is operably linked to a promoter; and (b) culturing the host cell to produce a host cell culture that expresses said antibody.

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- **45**. A replicable expression vector comprising DNA encoding an antibody heavy chain or fragment thereof and an antibody light chain or fragment thereof each having specificity for a desired antigen, the heavy chain or fragment thereof and the light chain or fragment thereof each comprising a variable region sequence and a human constant region sequence.
- **46**. A recombinant host cell comprising the vector of claim **45**.
- 47. A recombinant host cell comprising (a) a vector comprising DNA encoding an antibody heavy chain or fragment thereof comprising a variable region sequence and human constant region sequence and (b) a vector comprising DNA encoding an antibody light chain or fragment thereof comprising a variable region sequence and a human constant region sequence.

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